To: DEPUTY SECRETARIES, DIRECTORS AND BUREAU CHIEFS

From: Dianna L. Taylor

Bureau Chief of Personnel Management

Subject: Technical Vacancy

Date: September 21, 2017

Attached are the Position Summary Sheet and Position Description for the vacant technical position listed below. Please post this vacancy announcement September 25, 2017 in the designated areas.

The deadline for applicants to submit their applications for consideration is **4:30** p.m. on Tuesday, October **24**, **2017**. Applications will not be accepted after that time and date.

NOTE: Official college transcripts must be included with application. Applicants possessing an Engineer Intern License must also include a copy with application. Applicants not submitting these documents by the posting deadline will not be considered for employment. Please include IPR number on the application. Please be advised that if a high volume of applications are received, the applications may be screened to establish a smaller pool of applicants for interview. The screening will be based on the information contained in the application.

If you have any questions, please contact the Bureau of Personnel Management at 217/782-5594.

CET (2 pos) Material Investigations Engineer Trainee

Bureau of Materials

Highways Project Implementation

Springfield

Attachments 42303

*IDOT considers official college transcripts to be original embossed transcripts in a sealed envelope from the university/college or in PDF format sent from the university/college directly to the Bureau of Personnel Management.

Technical Applications PM1080 rev 6/1/17**must be received by the Bureau of Personnel Management, Room 113, 2300 South Dirksen Parkway, Springfield, IL 62764 (Fax# 217/557-3134) or emailed to DOT.CO.BPM.EmploymentApplications@Illinois.gov by Tuesday, October 24, 2017, 4:30 p.m. Please include address, daytime phone and position for which applying if not already listed on application. Applicants will be notified in writing to schedule interviews.

NOTE: Official college transcripts must be included with application. Applicants possessing an Engineer Intern License must also include a copy with application. Applicants not submitting these documents by the posting deadline will not be considered for employment. Please include IPR number on the application. Please be advised that if a high volume of applications are received, the applications may be screened to establish a smaller pool of applicants for interview. The screening will be based on the information contained in the application.



Position Summary Sheet

An Equal Opportunity Employer

Classification: Civil Engineer Trainee (2 Positions) Salary: \$4,275 - \$4,655*

Position Title: Material Investigations Engineer Trainee Union Position:

Position Number: PW110 23-75-702-62-01 IPR#: 42303

Office/Central Bureau/District/Work Address:

Office of Highways Project Implementation/Bureau of Materials, 126 East Ash Street, Springfield, IL

Description Of Duties:

This position is accountable for assisting in material investigations, quality testing, and/or inspection of hot-mix asphalt, portland cement concrete, portland cement concrete products, metals and miscellaneous products, or other materials utilized in transportation infrastructure as required.

Special Qualifications:

Required:

- Bachelor of Science in Civil Engineering from an ABET accredited university prior to date of employment or must be a Licensed Engineer Intern in the State of Illinois (includes those expecting to graduate in winter 2017/spring 2018)
- Minimum of 2.5 cumulative GPA in engineering related courses (If GPA is between a 2.0-2.5, candidate must have passed Fundamentals of Engineering Exam.)
- Official college transcripts must be included with application. (Official transcripts indicating graduation date for winter 2017/spring 2018 graduates must be provided at time of hire.)
- Valid driver's license
- Statewide and occasional out-of-state travel

Desired:

- Working knowledge of highway materials testing and laboratory testing equipment
- Ability to maintain cooperative relationships with departmental staff
- Strong oral and written communication skills

Shift/Remarks:

8:00 a.m. – 4:30 p.m. / Monday – Friday

THIS IS AN ENTRY-LEVEL POSITION AND IS A PART OF A ROTATION PROGRAM.

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*Individual salary offers are computed based on an applicant's current position and experience level in comparison to the posted title as well as internal equity of staff in the organizational unit.

^{**}Technical Application PM1080 (revised 6/1/17) is required. No previous version of the PM1080 will be accepted.

ILLINOIS DEPARTMENT OF TRANSPORTATION POSITION DESCRIPTION

DATE: September 8, 2017 **POSITION:** Material Investigations Engineer

Trainee

APPROVED BY: Brian Pfeifer **OFFICE/DIVISION:** Office of Highways Project

Implementation/Bureau of Materials

CODE: PW110 23-75-702-62-01 REPORTS TO: Project Studies Engineer

Position Purpose

This position is accountable for assisting in material investigations, quality testing, and/or inspection of hot-mix asphalt, portland cement concrete, portland cement concrete products, metals and miscellaneous products, or other materials utilized in transportation infrastructure as required.

Dimensions

Programs: All awarded construction contracts

Nature and Scope

This position reports to the Technical and Project Studies Engineer. As part of a rotation program, the incumbent may be transferred between various units (hot-mix asphalt operations, concrete technology, concrete products, geotechnical, metals and miscellaneous, etc.) with the bureau.

The greatest challenge to this position is in assisting with the evaluation of materials used in transportation infrastructure. A typical problem for the incumbent would be to conduct a study to determine how material properties contributed to an unexpected failure and to prepare a recommended solution to the problem.

This position assists with investigations, data collection and analysis, testing, and inspection of various materials utilized in transportation infrastructure. These materials include hot-mix asphalt (HMA), portland cement concrete (PCC), metals and miscellaneous products, or other materials as required.

This position is responsible for; 1) performing special and routine materials tests; 2) analyzing and correlating jobsite data with laboratory developed data; 3) testing and evaluating in-place materials which exhibit performance problems; 4) inspecting various materials producers; 5) assisting in the development and updating of materials publications, policies, and specifications; 6) assisting in the development of reports for special pavement investigations; and 7) assisting with evaluations of products proposed for use in transportation infrastructure.

The incumbent will travel throughout the state to obtain field data and assist with problem solving, perform inspections, monitor studies, collect data, and attending conferences and meetings. S/He may be required to travel out-of-state to participate in workshops and seminars.

The incumbent's primary contacts are within the bureau. However, the incumbent may have occasional contact outside the bureau with material producers, universities, and other department bureaus and districts.

The effectiveness of this position is measured by the success in satisfactorily completing assigned work by scheduled target dates; by the acceptability of collected, analyzed and summarized data; and by the effective communication of findings through oral and written summaries.

Principal Accountabilities

- 1. Conducts field and laboratory tests, evaluates test results, and correlates test results to ensure the applicability of laboratory developed results to field situations.
- 2. Performs inspections of materials producer's products.
- 3. Assists in the development and updating of materials publications and specifications.
- 4. Assists in the development of reports for special pavement investigations.
- 5. Assists with the evaluation of products proposed for use in transportation infrastructure.
- 6. Prepares memorandums and reports of findings.
- 7. Travels on an as-needed basis to perform the duties of this position.
- 8. Performs duties in compliance with departmental safety rules. Performs all duties in a manner conducive to the fair and equitable treatment of all employees.
- 9. Performs other duties as required or assigned.